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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/532,828	04/26/2005	Maximilian Angel	270415US0PCT	8877
22850 7590 02/17/2009 OBLON, SPIVAK, MCCLELLAND MAIER & NEUSTADT, P.C. 1940 DUKE STREET ALEXANDRIA, VA 22314			EXAMINER MULCAHY, PETER D	
			ART UNIT	PAPER NUMBER
			1796	
			NOTIFICATION DATE	DELIVERY MODE
			02/17/2009	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary	Application No.	Applicant(s)	
	10/532,828	ANGEL ET AL.	
	Examiner	Art Unit	
	Peter D. Mulcahy	1796	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 20 October 2008.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 10-15, 17, 18, 20, 21, 26-35, 40 and 45-48 is/are pending in the application.
- 4a) Of the above claim(s) 10-15, 17, 20, 21, 28-30, 33, 34, 40 and 45 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 18, 26, 27, 31, 32, 35 and 46-48 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--------------------------------------------------------------------------------------|-------------------------------------------------------------------|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

2. Claims 18, 26, 27, 31, 32, 35 and 48 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. The express exclusion of acrylic acid as monomer C is new matter. This is a clear example of a negative limitation. Following *Ex parte Grasselli*, 231 USPQ 393 (Bd. App.1983), *aff'd* mem., 783F. 2d 453 (Fed. Cir. 1984), a negative limitation, which does not have basis in the original disclosure, fails to comply with the written description requirement. The express exclusion of certain elements implies the permissible inclusion of all other elements not expressly excluded. Applicants cannot claim the forest and subsequently exclude, by negative limitation, random trees. Applicant argues that the express exclusion of the acrylic acid monomer C complies with the description requirement and cites *In re Johnson*, 558 F.2d 1008, 194 USPQ 187 (CCPA), as controlling authority. This is not persuasive and, *In re Johnson*, because of important factual distinctions, is not controlling. *In re Johnson* provides support for negative limitations when there is a basis in the original disclosure. If alternative elements are positively recited in the

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specification, they may be explicitly excluded in the claims. In the instant case there is no positive recitation of alternatives. The acrylic acid, monomer C, which applicants are attempting to expressly exclude, is not identified in the specification as an alternative to other monomeric species. As such its express exclusion is not supported by the instant specification.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claim 46 is rejected under 35 U.S.C. 103(a) as being unpatentable over Shih et al. US 5,219,906.

5. The Shih et al. patent has been previously cited as showing vinyl pyrrolidone polymers. Monomers falling within the scope of the claimed monomer B are disclosed at column 2 lines 23-26. The amount of the monomer B is disclosed as less than 10%. This is seen to fall within the scope of the claimed range of 0.5 to 60%. Solvents as claimed are shown at column 1 line 64. The difference between the claimed polymer and the cited art is the amount of acetic acid, monomer C, is greater than 10%. Applicant points out that the Shih patent is directed to polymers wherein the acrylic acid monomer is at least 20%. This difference is acknowledged. This difference does not render the claim patentably distinct from the cited art. The art is not limited to the 20% acrylic acid but uses the term "about" when describing the preferred amount. This

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clearly imparts flexibility to the amount used. One of ordinary skill would have a reasonable expectation of the resultant properties when using less than "about 20%" acrylic acid and there are no allegations or showing of unexpected results when 10% monomer C is used. Obviousness does not require absolute predictability and it is obvious to optimize proportions. Furthermore, mentioned disadvantages do not negate patentability. As such, one is motivated to use less acrylic acid given the appreciation of the resultant properties and understanding the state of the art.

6. Claims 18, 26, 27, 31, 32, 35 and 46-48 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dupis US 5,900,229.

7. This patent teaches polymers based on the claimed lactam, acrylate and monomer C, column 2 lines 7-20. The claimed solvent is disclosed at column 3 line 44. The K value as claimed is presumed to be inherently met given it is a property limitation based upon the composition. The claimed composition is rendered obvious and the inherent properties as claimed are considered anticipated and/or obvious from the art as well.

8. Claim 47 limits the polymer to a copolymer given that monomer C is present in 0%. This patent renders obvious this claim as well. It is well settled that it is prima facie obvious to leave out a known ingredient and lose its known function.

9. Claims 18, 26, 27 35 and 46-48 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nakata US 6,642,333.

10. This patent teaches co-polymers based on the claimed lactam and acrylate monomers, see column 4 lines 59+. The claimed solvent is disclosed at column 5 line

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45. The K value as claimed is disclosed at column 7 lines 34+. The difference between the claimed invention and the cited teaching is that the solvent meeting the claims must be selected from those listed at column 7 lines 44-45. The diethylene glycol is disclosed as one of the 5 species listed. One would be motivated to select this solvent given the art appreciates the utility and lack of unexpected results.

Conclusion

11. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Peter D. Mulcahy whose telephone number is 571-272-1107. The examiner can normally be reached on Mon.-Fri. 8-4:30.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached on 571-272-1114. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Peter D. Mulcahy/
Primary Examiner, Art Unit 1796